

# METHODS AND APPARATUS FOR SECURITY OVER FIBRE CHANNEL

## Abstract of the Disclosure

5

Methods and apparatus are provided for improving both node-based and message-based security in a fibre channel network. Entity to entity authentication and key exchange services can be included in existing initialization messages used for introducing fibre channel network entities into a fibre channel fabric, or with specific  
10 messages exchanged over an already initialized communication channel. Both per-message authentication and encryption mechanisms can be activated using the authentication and key exchange services. Messages passed between fibre channel network entities can be encrypted and authenticated using information provided during the authentication sequence. Security services such as per-message  
15 authentication, confidentiality, integrity protection, and anti-replay protection can be implemented.

10034367.122701  
T02221 292001